

**norma**

# Ammunition and components

Technical information



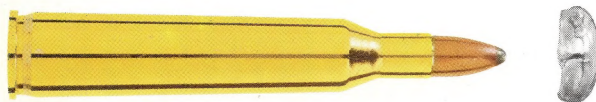


1. Brass cup	5. Trimming	9. Second necking	11. Flashhole drilling
2. First draw	6. Heading	10. Extractor	12. Finished case after
3. Second draw	7. Annealing	groove cutting	mouth anneal and
4. Third draw	8. First necking	and mouth trim	polishing





## 220 Swift



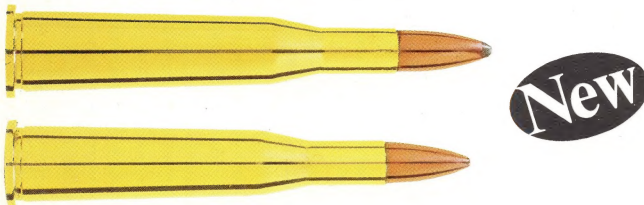
65701 · 50 gr/3,2 g

## 222 Rem.

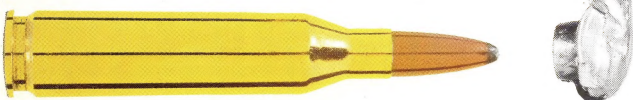


65701 · 50 gr/3,2 g 65702 · 50 gr/3,2 g

## 5.6x52 R (22 Sav. Hi-Power)



## 243 Win.



66003 · 100 gr/6,5 g

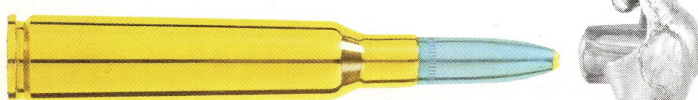
## 6.5 Jap



66531 · 139 gr/9,0 g

66532 · 156 gr/10,1 g

## 6.5x55



66551 · 77 gr/5,0 g

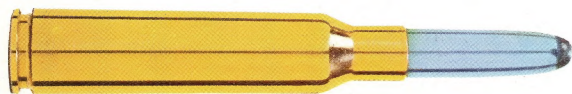
66512 · 139 gr/9,0 g

66532 · 156 gr/10,1 g

Cartr. index no.	Bullet weight		Bullet style	Bullet			Case index no.
	grains	grams		length inch.	diam. inch.	index no.	
<p>American high velocity cartridge developed in 1935, based on the 6 mm Lee Navy round. A quite successful varmint cartridge, its muzzle velocity hasn't really been beaten by later developments.</p>							
15701	50	3.2	Soft point semi pointed	.65	.224	65701	25701
<p>A logical step in cartridge design, this round also became popular in countries where there are no actual varmints, but people rather hunt for food. Loaded down versions have become popular for bird and other small game.</p>							
15711	50	3.2	Soft point semi pointed	.65	.224	65701	25711
15712	50	3.2	Full jacket semi pointed	.63	.224	65702	25711
15713	50	3.2	Full jacket semi pointed	.63	.224	65702	25711
<p>An old number designed by the famous Charles Newton - still popular in Europe under the metric designation 5.6x52 R - especially because the rimmed case makes it suitable for break-open type guns.</p>							
15604	71	4.6	Soft point semi pointed	.83	.228	65604	27004
15605	71	4.6	Full jacket semi pointed	.83	.228	65605	27004
<p>Introduced 1955, this round soon became the most popular of the then new 6 mm designs. Its case is the 308 or 7.62 NATO round necked down to 6 mm, and most manufacturers chamber their guns for it today.</p>							
16003	100	6.5	Soft point semi pointed	.98	.243	66003	26001
16002	100	6.5	Full jacket semi pointed	.98	.243	66002	26001
<p>Japanese military cartridge of 1897, now used only in World War II souvenir guns, of which by far the largest number is found in the USA. Comparable to the 6.5 Mannlicher and similar numbers for power.</p>							
16531	139	9.0	Soft point semi pointed bt	1.22	.264	66531	26531
16532	156	10.1	Soft point round nose	1.12	.264	66532	26531
<p>This is the Swedish and Norwegian military round of 1894. A very accurate cartridge with moderate recoil, it has become extremely popular with target shooters in many countries, and is also used widely for hunting.</p>							
16550	77	5.0	Soft point semi pointed	.69	.264	66551	26551
16557	139	9.0	Plastic Pointed "Dual-Core"	1.22	.264	66512	26551
16552	156	10.1	Soft point round nose	1.12	.264	66532	26551



## 6.5 Carcano



66532 · 156 gr/10,1 g

## 270 Win.



66902 · 130 gr/8,4 g



66903 · 150 gr/9,7 g

## 7x57



67002 · 150 gr/9,7 g

## 7x57 R



67002 · 150 gr/9,7 g



67003 · 150 gr/9,7 g

## Super 7x61



67002 · 150 gr/9,7 g

## 7 mm Rem. Magnum



67002 · 150 gr/9,7 g

Cartr. index no.	Bullet weight		Bullet style	Bullet			Case index no.
	grains	grams		length inch.	diam. inch.	index no.	

Another cartridge for collector's rifles, designed for the Italian Army in 1891. Again, this is a round similar in performance to the 6.5 Mannlicher, which became very popular for hunting in many parts of the world.

16535	156	10.1	Soft point round nose	1.12	.264	66532	26535
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Brought out by Winchester in 1923, this is practically the 30-06 necked down to 270 caliber. It is one of the most versatile cartridges in existence, covering a wide range of the game found in most countries.

16902	130	8.4	Soft point semi pointed bt	1.09	.277	66902	26901
16903	150	9.7	Soft point semi pointed bt	1.21	.277	66903	26901

Developed for the 1893 Spanish Mauser service rifle, the 7x57 has been regarded as one of most well designed and well balanced rounds in existence. Not only a ballisticians delight for looks, but also for overall performance.

17002	150	9.7	Soft point semi pointed bt	1.17	.283	67002	27001
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**New**

This is the rimmed version of the 7x57, especially developed for break-open type actions such as the many European single shot, double rifles and combination guns, e.g. 12 gauge/7x57 R for small to medium game.

17005	150	9.7	Soft point semi pointed bt	1.15	.283	67002	27004
17006	150	9.7	Full jacket pointed bt	1.24	.283	67003	27004

This is the 7x61 Sharpe & Hart cartridge, designed about 1950 by the well-known writer and ballisticians Philip B. Sharpe. Internal redesign gave slightly more volume and the designation "Super".

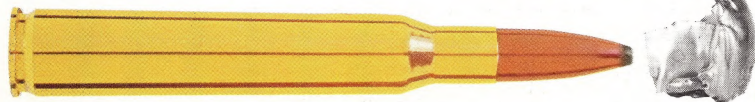
17012	150	9.7	Soft point semi pointed bt	1.17	.283	67002	27011
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Remington brought out this cartridge in 1962, similar to the 7x61 but with somewhat larger case volume, more like the 7 mm Weatherby Magnum. An excellent big game cartridge that has become popular also in Europe.

17021	150	9.7	Soft point semi pointed bt	1.17	.283	67002	27021
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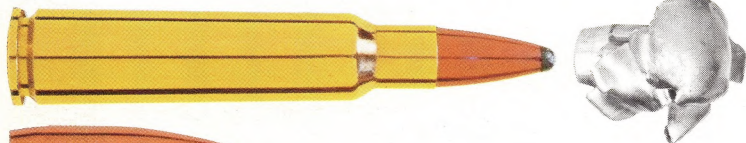
## 7x64



67002 · 150 gr/9,7 g ①

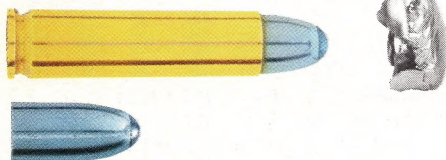
175 gr/11,3 g Nosler

## 7.5x55 Swiss



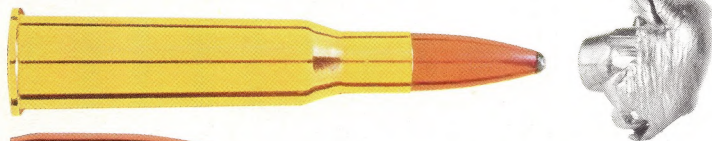
67625 · 180 gr/11,6 g ①

## 30 US Carbine



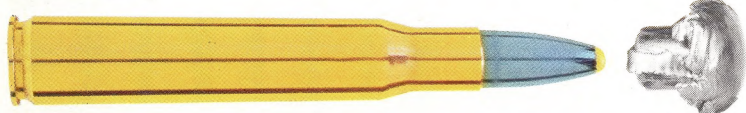
67621 · 110 gr/7,1 g ①

## 7.62 Russian



67625 · 180 gr/11,6 g ①

## 30-06



67623 · 130 gr/8,4 g ①

67624 · 150 gr/9,7 g ①

67628 · 180 gr/11,6 g ①



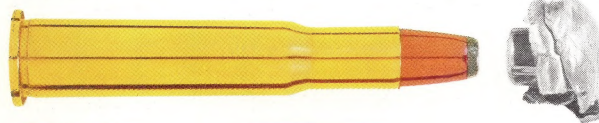
180 gr/11,6 g Nosler

67648 · 180 gr/11,6 g ①

Cartr. index no.	Bullet weight		Bullet style	Bullet			Case index no.
	grains	grams		length inch.	diam. inch.	index no.	
<p>This is one of the designs of Wilhelm Brenneke (1865-1951) and dates back to 1912. It comes very close to the 270 Winchester and is the most popular game cartridge in Europe today.</p>							
17013	150	9.7	Soft point semi pointed bt	1.17	.283	67002	27012
17014	175	11.3	Soft point Nosler	1.28	.283	67036	27012
<p>Originally designed in 1889 and improved by a pointed type bullet in 1911, this is the Swiss service cartridge also today. It is famous for accuracy and in the soft pointed version also an excellent hunting round.</p>							
17511	180	11.6	Soft point semi pointed bt	1.22	.308	67625	27511
<p>Based on the 32 Winchester Self Loading cartridge, this round was designed in 1940 for use in an automatic military carbine - to be known to tens of thousands of servicemen as the US Carbine M1 of World War II.</p>							
17621	110	7.1	Soft point round nose	.69	.308	67621	27620
<p>Service cartridge of the Russian army, dates back to 1891, improved by pointed bullet in 1908. Large quantities of rifles ordered by Russia were sold on the US civilian market after the Russian revolution in 1917, and the ammunition likewise made for civilian sale.</p>							
17634	180	11.6	Soft point semi pointed bt	1.22	.308	67625	27634
<p>This US Service round of 1906 hardly needs introduction in the hunting and shooting world. It is available in a wide variety of bullet types and weights, and is probably also the most handloaded round in the world.</p>							
17640	130	8.4	Soft point semi pointed bt	.93	.308	67623	27640
17643	150	9.7	Soft point semi pointed bt	1.00	.308	67624	27640
17653	180	11.6	Plastic Pointed "Dual-Core"	1.18	.308	67628	27640
17649	180	11.6	Soft point "Nosler"	1.26	.308	-	27640
17648	180	11.6	Soft point round nose	1.11	.308	67648	27640



## 30-30 Win.



67630 · 150 gr/9,7 g

67631 · 170 gr/11,0 g

## 308 Win.



67623 · 130 gr/8,4 g

67624 · 150 gr/9,7 g

67628 · 180 gr/11,6 g

## 308 Norma Magnum



67628 · 180 gr/11,6 g

## 7.65 Argentine



67701 · 150 gr/9,7 g

## 303 British



67701 · 150 gr/9,7 g

67713 · 180 gr/11,6 g

Cartr. index no.	Bullet weight		Bullet style	Bullet				Case index no.
	grams	grams		length inch.	diam. inch.	index no.		

One of the most popular hunting rounds in the world, this cartridge came out along with the famous 1894 carbine. Powerful enough for game up to deer size, it also has the advantage of being available in almost every part of the world.

17630	150	9.7	Soft point flat nose	.91	.308	67630	27630
17631	170	11.0	Soft point flat nose	.98	.308	67631	27630

This is the civilian version of the 7.62 NATO round. Ballistically almost up to the 30-06 it has gained popularity due to its adaptability to shorter rifle actions.

17623	130	8.4	Soft point semi pointed bt	.93	.308	67623	27623
17624	150	9.7	Soft point semi pointed bt	1.00	.308	67624	27623
17628	180	11.6	Plastic Pointed "Dual-Core"	1.18	.308	67628	27623

Norma brought out this round in 1961 and it was the first commercially loaded short 30 caliber magnum. Large numbers of 30-06 rifles were rechambered for the 308 Norma as their magazine length was sufficient.

17638	180	11.6	Plastic Pointed "Dual-Core"	1.18	.308	67628	27637
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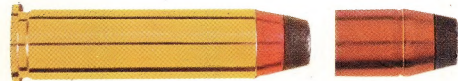
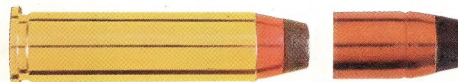
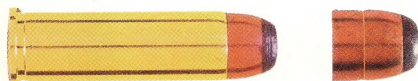
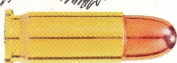
Originally designed for the Belgian Army in 1889, the excellent Mausers of Fabrique Nationale in Liège soon brought it into the armies of several South American countries. Argentine surplus Mausers have been imported into the USA in later years.

17701	150	9.7	Soft point semi pointed	1.00	.311	67701	27701
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The famous British Service cartridge of 1903, that went through so many battles with the equally famous Lee-Enfield rifles. This round also became a very popular hunting cartridge in the colonies and not least in Canada.

17712	150	9.7	Soft point semi pointed	1.00	.311	67701	27711
17713	180	11.6	Soft point semi pointed bt	1.18	.311	67713	27711





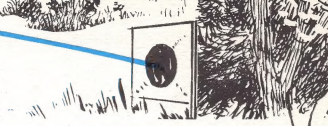
Cartr. index no.	Bullet weight		Bullet style	Bullet			Case index no.	Norma primer	Cartr. length inch.	Norma powder no.	Load grains	Press. psi	Velocity feet/sec.	Energy foot/pounds	Muzzle	Barrel length inch.
	grains	grams		length inch.	diam. inch.	index no.										
25 ACP																
16401	50	3.2	Full jacket r. nose ⊕	.46	.251	-	-	SP	.91	-	-	18850	810	100	2.0	
30 Luger																
17612	93	6.0	Full jacket r. nose ⊕	.58	.308	67612	-	SP	1.18	-	-	37700	1230	312	4.7	
32 ACP																
17614	77	5.0	Full jacket r. nose ⊕	.49	.308	67610	-	SP	.98	-	-	26100	900	139	4.0	
9 mm Luger																
19021	115	7.4	Hollow point ⊕	.57	.355	69021	29021	SP	1.11	-	-	36300	1165	350	4.7	
19022	116	7.5	Full jacket r. nose ⊕	.60	.355	69010	29021	SP	1.16	-	-	36300	1165	350	4.7	
19026	116	7.5	Soft point flat nose ⊕	.53	.355	69026	29021	SP	1.11	-	-	36300	1165	350	4.7	
	116	7.5	Loading data	.60	.355	69010	29021	SP	29.5	R-1	3.8	36300	1115	325	4.7	
38 Special																
19119	110	7.1	Hollow point ⊕	.51	.357	69123	29110	SP	1.46	-	-	20000	1542	580	6.0	
19110	148	9.6	Lead wadcutter	.65	.357	69110	29110	SP	1.16	R-1	2.5	17000	800	210	6.0	
19112	158	10.2	Lead round nose	.69	.357	69112	29110	SP	1.50	R-1	3.5	20000	870	266	6.0	
19124	158	10.2	Soft point flat nose	.73	.357	69107	29110	SP	1.48	R-1	4.2	20000	900	285	6.0	
19125	158	10.2	Hollow point	.68	.357	69101	29110	SP	1.46	R-1	4.2	20000	900	285	6.0	
357 Magnum																
19101	158	10.2	Hollow point	.68	.357	69101	29101	SP	1.59	R-123	13.9	40600	1450	735	8 3/8	
19107	158	10.2	Soft point flat nose	.66	.357	69107	29101	SP	1.59	R-123	13.9	40600	1450	735	8 3/8	
38 S&W																
19131	146	9.5	Lead round nose	.65	.359	-	-	SP	1.16	R-1	2.0	13800	730	173	4.0	
44 Magnum																
11101	236	15.3	Hollow point ⊕	.69	.430	61101	21101	LP	1.61	R-123	19.1	40600	1675	1476	18.5	



Cartr. index no.	Cartr. length inch.	Norma primer	Load Norma powder grains	Velocity – Feet per sec.				Energy – Foot pounds				Press. psi	Sight at yards	Line of sights 1 1/2" above center of bore. + indicates point of impact in inches above, – in inches below sighting point.					
				Muzzle	100 yards	200 yards	300 yards	Muzzle	100 yards	200 yards	300 yards			25 yards	50 yards	100 yards	150 yards	200 yards	300 yards
15701	2.62	LR	203 40.9	4110	3611	3133	2681	1877	1448	1090	799	53700	100	-0.9	-0.5	0	-0.2	-1.2	-5.9
	Special load		203 39.2	3910	×	×	×	×	×	×	×	×	180	-0.8	-0.3	+0.4	+0.4	-0.4	-4.7
	Special load		203 37.8	3710	×	×	×	×	×	×	×	×	200	-0.8	-0.2	+0.6	+0.7	0	-4.1
15711	2.11	SR	200 21.0	3200	2650	2170	1750	1137	780	520	340	46400	100	-0.8	-0.3	0	-0.9	-3.2	-12.9
	Special load		200 20.2	3000	×	×	×	×	×	×	×	×	180	-0.5	+0.3	+1.2	+0.8	-0.9	-9.4
	Special load		200 18.5	2800	×	×	×	×	×	×	×	×	200	-0.4	+0.5	+1.6	+1.5	0	-8.2
15712	2.11	SR	200 21.0	3200	2610	2080	1630	1137	756	480	295	46400	100	-0.7	-0.2	0	-1.1	-3.7	-15.7
	Special load		200 20.2	3000	×	×	×	×	×	×	×	×	180	-0.4	+0.5	+1.4	+1.0	-1.0	-11.6
	Special load		200 18.5	2800	×	×	×	×	×	×	×	×	200	-0.3	+0.7	+1.9	+1.7	0	-10.1
15713	2.11	SR	200 17.7	2789	2235	1755	1390	863	554	341	214	46400	100	-0.6	±0.0	0	-1.7	-5.8	-23.4
													180	-0.1	+1.0	+2.1	+1.5	-1.5	-17.1
													200	+0.1	+1.4	+2.9	+2.6	0	-14.8
15604	2.50	LR	201 25.1	2788	2296	1886	1558	1226	831	561	383	42100	100	-0.6	-0.1	0	-1.5	-4.8	-18.6
													180	-0.2	+0.8	+1.8	+1.2	-1.2	-13.2
													200	±0.0	+1.1	+2.4	+2.1	0	-11.4
15605	2.50	LR	201 25.1	2788	2296	1886	1558	1226	831	561	383	42100	100	-0.6	-0.1	0	-1.5	-4.8	-18.6
													180	-0.2	+0.8	+1.8	+1.2	-1.2	-13.2
													200	±0.0	+1.1	+2.4	+2.1	0	-11.4
16003	2.62	LR	204 45.1	3070	2790	2540	2320	2090	1730	1430	1190	52200	100	-0.7	-0.2	0	-0.9	-2.9	-10.6
	Special load		204 43.8	2870	×	×	×	×	×	×	×	×	180	-0.5	+0.3	+1.1	+0.7	-0.7	-7.4
	Special load		204 42.0	2670	×	×	×	×	×	×	×	×	200	-0.4	+0.5	+1.4	+1.3	0	-6.3
16002	2.62	LR	204 45.1	3070	2790	2540	2320	2090	1730	1430	1190	52200	100	-0.7	-0.2	0	-0.9	-2.9	-10.6
	Special load		204 43.8	2870	×	×	×	×	×	×	×	×	180	-0.5	+0.3	+1.1	+0.7	-0.7	-7.4
	Special load		204 42.0	2670	×	×	×	×	×	×	×	×	200	-0.4	+0.5	+1.4	+1.3	0	-6.3
16531	2.82	LR	203 32.8	2428	2280	2130	1990	1820	1605	1401	1223	32200	100	-0.5	±0.0	0	-1.8	-5.4	-18.8
	Special load		201 28.2	2228	×	×	×	×	×	×	×	×	130	-0.4	+0.4	+0.6	-0.8	-4.1	-16.9
	Special load		200 24.0	2028	×	×	×	×	×	×	×	×	200	+0.1	+1.4	+2.7	+2.3	0	-10.8
16532	2.89	LR	203 29.3	2067	1871	1692	1529	1481	1213	992	810	32200	100	-0.3	+0.4	0	-2.9	-8.5	-29.2
	Special load		201 24.7	1867	×	×	×	×	×	×	×	×	130	±0.0	+0.9	+1.1	-1.2	-6.3	-26.0
	Special load		200 20.5	1667	×	×	×	×	×	×	×	×	200	+0.8	+2.5	+4.3	+3.5	0	-16.4
16550	2.62	LR	200 33.2	2725	2362	2030	1811	1271	956	706	562	45000	100	-0.6	-0.1	0	-1.5	-4.8	-18.1
	Special load		200 37.8	3116	×	×	×	×	×	×	×	×	180	-0.2	+0.8	+1.8	+1.2	-1.2	-12.7
	Special load		200 34.1	2916	×	×	×	×	×	×	×	×	200	±0.0	+1.1	+2.4	+2.1	0	-10.9
16557	2.99	LR	204 46.6	2788	2630	2470	2320	2402	2136	1883	1662	45000	100	-0.7	-0.2	0	-1.1	-3.7	-13.3
	Special load		203 39.5	2588	×	×	×	×	×	×	×	×	180	-0.3	+0.5	+1.4	+0.9	-0.9	-9.2
	Special load		203 36.5	2388	×	×	×	×	×	×	×	×	200	-0.2	+0.8	+1.8	+1.6	0	-7.8
16552	3.07	LR	204 44.2	2493	2271	2062	1867	2153	1787	1473	1208	45000	100	-0.6	+0.2	0	-1.7	-5.3	-18.8
	Special load		204 42.5	2293	×	×	×	×	×	×	×	×	180	±0.0	+1.0	+2.0	+1.3	-1.3	-12.7
	Special load		204 39.8	2093	×	×	×	×	×	×	×	×	200	+0.1	+1.3	+2.6	+2.2	0	-10.9
16535	2.97	LR	200 27.5	2000	1810	1640	1485	1386	1135	932	764	37700	100	-0.2	+0.4	0	-3.1	-9.1	-31.2
	Special load		200 25.2	1800	×	×	×	×	×	×	×	×	130	+0.1	+1.0	+1.2	-1.3	-6.8	-27.6
	Special load		200 23.0	1600	×	×	×	×	×	×	×	×	200	+0.9	+2.8	+4.6	+3.7	0	-17.5
16902	3.15	LR	204 57.0	3140	2884	2639	2404	2847	2401	2011	1669	52200	100	-0.8	-0.3	0	-0.8	-4.1	-10.7
	Special load		204 55.0	2940	×	×	×	×	×	×	×	×	180	-0.5	+0.2	+1.0	+0.7	-0.7	-7.7
	Special load		204 52.0	2740	×	×	×	×	×	×	×	×	200	-0.4	+0.4	+1.4	+1.3	0	-6.6
16903	3.23	LR	204 52.4	2800	2616	2436	2262	2616	2280	1977	1705	52200	100	-0.7	-0.2	0	-1.1	-3.6	-13.1
	Special load		204 50.5	2600	×	×	×	×	×	×	×	×	180	-0.3	+0.5	+1.4	+0.9	-0.9	-9.0
	Special load		204 46.7	2400	×	×	×	×	×	×	×	×	200	-0.2	+0.7	+1.8	+1.6	0	-7.7
17002	3.05	LR	203 44.1	2756	2539	2331	2133	2530	2148	1810	1516	49300	100	-0.7	-0.1	0	-1.2	-3.9	-14.3
	Special load		201 40.0	2556	×	×	×	×	×	×	×	×	180	-0.3	+0.6	+1.5	+1.0	-1.0	-9.8
	Special load		201 36.5	2356	×	×	×	×	×	×	×	×	200	-0.2	+0.9	+2.0	+1.7	0	-8.4
17005	3.05	LR	203 43.0	2690	2476	2270	2077	2411	2042	1717	1437	43500	100	-0.6	-0.1	0	-1.3	-4.2	-15.2
	Special load		203 42.0	2490	×	×	×	×	×	×	×	×	180	-0.2	+0.7	+1.6	+1.1	-1.0	-10.4
	Special load		201 36.3	2290	×	×	×	×	×	×	×	×	200	-0.1	+1.0	+2.1	+1.8	0	-8.9
17006	3.05	LR	203 43.0	2690	2476	2270	2077	2411	2042	1717	1437	43500	100	-0.6	-0.1	0	-1.3	-4.2	-15.2
	Special load		203 42.0	2490	×	×	×	×	×	×	×	×	180	-0.2	+0.7	+1.6	+1.1	-1.0	-10.4
	Special load		201 36.3	2290	×	×	×	×	×	×	×	×	200	-0.1	+1.0	+2.1	+1.8	0	-8.9
17012	3.19	LR	MRP 67.4	3165	2881	2619	2375	3337	2765	2285	1879	55100	100	-0.8	-0.3	0	-0.8	-2.7	-10.6
	Special load		204 58.5	2950	×	×	×	×	×	×	×	×	180	-0.5	+0.2	+1.0	+0.7	-0.7	-7.6
	Special load		204 55.3	2750	×	×	×	×	×	×	×	×	200	-0.4	+0.4	+1.4	+1.3	0	-6.5
17021	3.29	LR	MRP 71.4	3250	2960	2690	2440	3519	2919	2411	1983	55100	100	-0.8	-0.3	0	-0.7	-2.4	-9.5
	Special load		204 66.6	3060	×	×	×	×	×	×	×	×	180	-0.6	+0.1	+0.9	+0.6	+0.6	-6.8
	Special load		204 62.4	2860	×	×	×	×	×	×	×	×	200	-0.5	+0.3	+1.2	+1.1	0	-5.8
17013	2.13	LR	204 57.1	2888	2598	2329	2113	2779	2449	1807	1487	52200	100	-0.7	-0.2	0	-1.0	-3.3	-12.5
	Special load		204 52.9	2687	×	×	×	×	×	×	×	×	180	-0.4	+0.4	+1.2	+0.9	-0.8	-8.8
	Special load		204 49.5	2487	×	×	×	×	×	×	×	×	200	-0.3	+0.6	+1.7	+1.5	0	-7.5
17014	2.13	LR	MRP 56.6	2724	2516	2339	2198	2884	2460	2126	1878	52200	100	-0.7	-0.1	0	-1.2	-3.6	-12.7
	Special load		MRP 51.7	2474	×	×	×	×	×	×	×	×	180	-0.3	+0.6	+1.4	+0.9	-0.9	-8.5
	Special load		MRP 48.3	2274	×	×	×	×	×	×	×	×	200	-0.2	+0.8	+1.8	+1.6	0	-7.2
17511	2.91	LR	204 52.2	2650	2441	2248	2056	3060	2380	2020	1690	45000	100	-0.6	-0.1	0	-1.4	-4.3	-15.3
	Special load		204 54.0	2690	×	×	×	×	×	×	×	×	180	-0.2	+0.7	+1.6	+1.1	-1.0	-10.4
					×	×	×	×	×	×	×	×	200	-0.1	+1.0	+2.1	+1.8	0	-8.9



For the first time Norma now offers you tables showing trajectories at three different sighting-in ranges. With this table you may therefore find the most efficient trajectory and thereby the preferable sighting-in range for your kind of hunt. Since the tables for technical reasons only can show average figures, we recommend that you sight in your rifle at a target before taking it into the field, and be sure to use the same type of ammunition as the one you will be hunting with.



Cartr. index no.	Cartr. length inch.	Norma primer	Load	Velocity – Feet per sec.				Energy – Foot pounds				Press. psi	Line of sights 1 1/2" above center of bore. + indicates point of impact in inches above, – in inches below sighting point.						
				Muzzle	100 yards	200 yards	300 yards	Muzzle	100 yards	200 yards	300 yards		Sight at yards	25 yards	50 yards	100 yards	150 yards	200 yards	300 yards
17621	1.67	SR	- -	1970	1595	1300	1090	948	622	413	290	46400	100	-0.1	+0.6	0	-4.1	-12.4	-45.7
													130	+0.3	+1.4	+1.5	-1.8	-9.3	-41.1
													200	+1.4	+3.7	+6.2	+5.2	0	-27.0
17634	2.82	LR	203 45.2	2624	2415	2222	2030	2749	2326	1970	1644	47900	100	-0.6	-0.1	0	-1.4	-4.4	-15.7
	Special load		203 42.8	2424									180	-0.2	+0.8	+1.7	+1.1	-1.1	-10.7
	Special load		201 37.2	2224									200	-0.1	+1.0	+2.2	+1.9	0	-9.1
17640	3.11	LR	203 57.5	3280	2951	2636	2338	3108	2514	2006	1578	50800	100	-0.8	-0.3	0	-0.7	-3.9	-10.1
	Special load		203 55.0	3080									180	-0.6	+0.2	+0.9	+0.7	-0.7	-7.4
	Special load		203 52.5	2880									200	-0.5	+0.3	+1.3	+1.2	0	-6.3
17643	3.13	LR	203 54.7	2970	2680	2402	2141	2943	2393	1922	1527	50800	100	-0.7	-0.2	0	-1.0	-3.4	-12.9
	Special load		203 53.0	2770									180	-0.4	+0.4	+1.3	+0.9	-0.9	-9.1
	Special load		203 50.3	2570									200	-0.3	+0.6	+1.7	+1.5	0	-7.8
17653	3.17	LR	203 50.0	2700	2494	2296	2109	2914	2487	2107	1778	50800	100	-0.6	-0.1	0	-1.3	-4.1	-14.8
	Special load		203 47.0	2500									180	-0.3	+0.7	+1.5	+1.0	-1.0	-10.2
	Special load		201 41.6	2300									200	-0.1	+0.9	+2.0	+1.8	0	-8.7
17649	3.21	LR	203 50.0	2700	2494	2296	2109	2914	2487	2107	1778	50800	100	-0.6	-0.1	0	-1.3	-4.1	-14.8
	Special load		203 47.0	2500									180	-0.3	+0.7	+1.5	+1.0	-1.0	-10.2
	Special load		201 41.6	2300									200	-0.1	+0.9	+2.0	+1.8	0	-8.7
17648	3.15	LR	203 50.0	2700	2477	2261	2109	2893	2430	2025	1525	50800	100	-0.6	-0.1	0	-1.3	-4.1	-14.9
	Special load		203 47.0	2500									180	-0.3	+0.7	+1.6	+1.0	-1.7	-10.2
	Special load		201 41.6	2300									200	-0.1	+0.9	+2.1	+1.8	0	-8.7
17630	2.50	LR	201 35.5	2410	2075	1790	1550	1934	1433	1066	799	43500	100	-0.5	+0.1	0	-2.2	-7.0	-26.1
	Special load		201 32.5	2210									130	-0.3	+0.6	+0.8	-1.0	-5.4	-23.6
	Special load		200 26.1	2010									200	+0.4	+1.9	+3.5	+3.0	0	-15.6
17631	2.50	LR	201 32.4	2220	1890	1630	1410	1860	1350	1000	750	43500	100	-0.4	+0.3	0	-2.7	-8.1	-29.2
	Special load		200 26.3	2020									130	-0.1	+0.8	+1.0	-1.2	-6.1	-26.3
	Special load		200 23.3	1820									200	+0.6	+2.3	+4.0	+3.4	0	-17.1
17623	2.62	LR	200 40.6	2900	2590	2300	2030	2428	1937	1527	1190	52200	100	-0.7	-0.2	0	-1.1	-3.7	-14.2
	Special load		200 38.2	2700									180	-0.4	+0.5	+1.4	+1.0	-0.9	-10.0
	Special load		200 35.1	2500									200	-0.2	+0.8	+1.9	+1.7	0	-8.6
17624	2.65	LR	201 45.5	2860	2570	2300	2050	2725	2200	1760	1400	52200	100	-0.7	-0.2	0	-1.2	-3.8	-14.2
	Special load		201 43.3	2660									180	-0.3	+0.6	+1.4	+1.0	-1.0	-10.0
	Special load		201 40.6	2460									200	-0.2	+0.8	+1.9	+1.7	0	-8.5
17628	2.70	LR	203 44.3	2610	2400	2210	2020	2725	2303	1952	1631	52200	100	-0.6	-0.1	0	-1.4	-4.5	-16.2
	Special load		203 41.1	2410									180	-0.2	+0.8	+1.7	+1.1	-1.1	-11.0
	Special load		203 38.0	2210									200	±0.0	+1.1	+2.3	+1.9	0	-9.4
17638	3.25	LR MRP	74.3	3020	2798	2585	2382	3646	3130	2671	2268	55100	100	-0.8	-0.3	0	-0.8	-2.6	-10.1
	Special load		204 71.8	2900									180	-0.5	+0.2	+1.0	+0.7	-0.7	-7.1
	Special load		204 70.0	2700									200	-0.4	+0.4	+1.3	+1.2	0	-6.1
17701	2.85	LR	201 47.8	2920	2630	2355	2105	2841	2304	1848	1476	49300	100	-0.7	-0.2	0	-1.0	-3.6	-12.9
	Special load		201 44.0	2720									180	-0.4	+0.5	+1.3	+0.9	-0.9	-9.1
	Special load		201 42.5	2720									200	-0.3	+0.7	+1.7	+1.5	0	-7.8
17712	2.95	LR	201 44.6	2720	2440	2170	1930	2465	1983	1569	1241	46400	100	-0.6	-0.1	0	-1.4	-4.4	-16.3
	Special load		201 41.4	2520									180	-0.2	+0.7	+1.7	+1.1	-1.1	-11.3
	Special load		200 33.9	2320									200	-0.1	+1.0	+2.2	+1.9	0	-9.7
17713	2.97	LR	203 43.7	2540	2340	2147	1965	2579	2189	1843	1544	46400	100	-0.6	±0.0	0	-1.6	-4.9	-17.3
	Special load		203 40.5	2340									130	-0.4	+0.3	+0.6	-0.7	-3.7	-15.6
	Special load		201 36.2	2140									200	±0.0	+1.2	+2.4	+2.1	0	-10.0
17721	2.84	LR	203 50.0	2952	2635	2340	2065	2513	2004	1581	1231	39200	100	-0.7	-0.2	0	-1.1	-3.5	-13.5
	Special load		203 48.0	2752									180	-0.4	+0.5	+1.3	+0.9	-0.9	-9.5
	Special load		203 46.0	2552									200	-0.3	+0.7	+1.8	+1.6	0	-8.2
17722	3.03	LR	203 45.2	2493	2292	2101	1922	2484	2100	1765	1477	39200	100	-0.6	±0.0	0	-1.7	-5.2	-18.1
	Special load		203 43.8	2293									130	-0.4	+0.3	+0.6	-0.8	-3.9	-16.3
	Special load		203 39.7	2093									200	+0.1	+1.3	+2.6	+2.2	0	-10.4
18003	2.95	LR	203 48.3	2526	2195	1894	1627	2778	2097	1562	1152	49300	100	-0.6	±0.0	0	-1.8	-5.8	-21.4
	Special load		203 45.4	2326									130	-0.4	+0.4	+0.7	-0.8	-4.4	-19.3
	Special load		200 36.4	2126									200	+0.2	+1.5	+2.9	+2.5	0	-12.7
18007	2.97	LR	203 48.3	2526	2195	1894	1627	2778	2097	1562	1152	49300	100	-0.6	±0.0	0	-1.8	-5.8	-21.4
	Special load		203 45.4	2326									130	-0.4	+0.4	+0.7	-0.8	-4.4	-19.3
	Special load		200 36.4	2126									200	+0.2	+1.5	+2.9	+2.5	0	-12.7
19001	3.23	LR	203 70.2	2800	2493	2231	2001	4322	3451	2764	2223	53400	100	-0.7	-0.1	0	-1.2	-4.0	-14.3
	Special load		203 65.7	2600									180	-0.3	+0.6	+1.5	+1.0	-1.0	-9.8
	Special load		201 57.0	2400									200	-0.2	+0.9	+2.0	+1.7	0	-8.3
19302	3.01	LR	201 44.6	2067	1818	1595	1404	2714	2099	1616	1252	36300	100	-0.3	+0.4	0	-3.1	-9.1	-32.0
	Special load		201 40.6	1867									130	±0.0	+1.0	+1.1	-1.3	-6.8	-28.5
	Special load		200 34.2	1667									200	+0.9	+2.7	+4.6	+3.8	0	-18.3
19314	3.23	LR	201 54.7	2362	2088	1815	1592	3544	2769	2092	1700	49300	100	-0.5	+0.1	0	-2.1	-6.5	-23.5
	Special load		201 51.2	2162									180	+0.1	+1.4	+2.5	+1.6	-1.6	-16.0
	Special load		200 44.0	1962									200	+0.3	+1.8	+3.3	+2.8	0	-13.7

The breech pressures shown are the maximum permitted for the caliber in question according to international agreements. Where such agreement does not yet exist, the table shows the maximum permitted breech pressure according to our own standards. The breech pressure of our factory loaded ammunition is normally 10 to 20 % below the maximum level. Loading data in light print are factory loads. Loading data in bold print are given as service to the handloaders.



# Private brand manufacture



Roy E. Weatherby, famous riflemaker of California, came to Norma in 1954 to discuss future production of his line of special high velocity rifle cartridges. Since then, Norma has produced Weatherby ammunition in all calibers, including the new 224 Varmintmaster, the excellent 340 Weatherby Magnum and last, but not least the extremely powerful 378 and 460 Weatherby Magnums. The latter two incorporate brass cases of entirely new dimensions, and several machines had to be rebuilt to handle the larger diameter and length of this brass. As a matter of fact, initial production runs were carried out in machinery designed for artillery cases!

Another private brand customer of Norma is Walter Gehmann, ex world champion shooter and owner of a well-known gun company in Western Germany - and proprietor of the famous vom Hofe line of high velocity magnum rifle cartridges. Vom Hofe, successor of the well-known ballistician Gerlich, designed a high-velocity .22 caliber cartridge in 1937, known as the 5,6x61. After vom Hofe's death in 1945 Walther Gehmann developed the 7x66 Super Express - replacing the earlier 7x73 that vom Hofe had designed in 1931 and which required a magnum-length action. Gehmann also designed the 7x75 R Super Express round, a rimmed type for double rifles and combination guns. The 5,6x61,

the 7x66 and 7x75 R are now manufactured by Norma, under the vom Hofe brand.

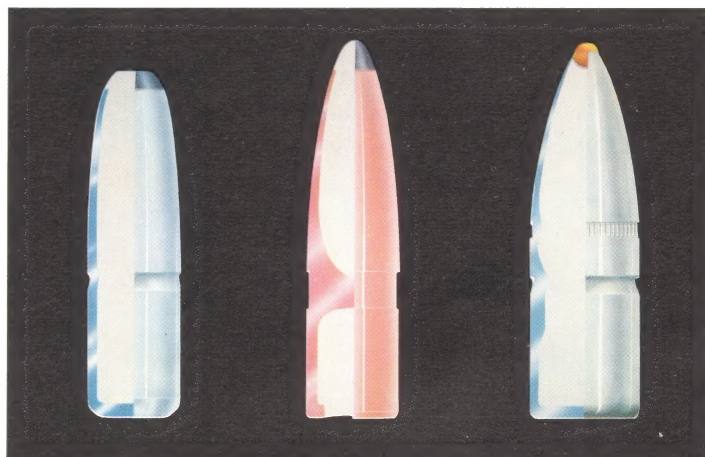
Please note that these ammunitions are made to special order for the two above-mentioned companies, and are not a part of the Norma sales program. For Weatherby ammo, ask Weatherby Inc., 2781 Firestone Boulevard, South Gate, California 90280 USA or their European representative, J.H. Rockwell, Seestrasse 98, 6052 Hergiswil, Suisse - and if you have a vom Hofe rifle, turn to Walter Gehmann, 75 Karlsruhe, Karlstr. 40, Western Germany.



## **norma** Hunting Bullets

Three different types of bullets are used for our sporting cartridges:

1. Soft point design with reinforced rear part of the jacket and regular mushrooming action.
2. The famous partition bullet by John Nosler. Efficient mushrooming of the front part together with powerful penetration of the practically indestructible rear end makes this design an extremely efficient game bullet.
3. "Dual-Core" bullet, new design with plastic ball point. This ball prevents deformation of the lead core during recoil, and acts as an efficient starter for the mushrooming of the bullet upon impact. A reliable, accurate hunting bullet.



**Soft point • Nosler • Dual-Core**



# norma

## .22 cal. (.264) 7 MM (.283)



65701 · 50 gr/3,2 g



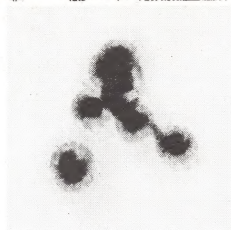
65702 · 50 gr/3,2 g



67002 · 150 gr/9,7 g ⊕



67003 · 150 gr/9,7 g ⊕



## .35 cal. (.358)



69001 · 250 gr/16,2 g ⊕

## .30 cal. (.308)



67612 · 93 gr/6,0 g ⊕



67610 · 77 gr/5,0 g ⊕

## 6 MM (.243)



66003 · 100 gr/6,5 g ⊕



## .30 cal. (.308)



67621 · 110 gr/7,1 g ⊕



67623 · 130 gr/8,4 g ⊕



67602 · 146 gr/9,5 g ⊕



67624 · 150 gr/9,7 g ⊕



67630 · 150 gr/9,7 g



67631 · 170 gr/11,0 g



67625 · 180 gr/11,6 g ⊕



67628 · 180 gr/11,6 g ⊕



67648 · 180 gr/11,6 g ⊕

## .303 cal. (.311)



67711 · 130 gr/8,4 g ⊕



67701 · 150 gr/9,7 g ⊕



67713 · 180 gr/11,6 g ⊕



67715 · 215 gr/14,0 g ⊕

## 9.3 MM (.365)



69303 · 286 gr/18,5 g ⊕



## 9 MM (.355)



69021 · 115 gr/7,4 g ⊕



69010 · 116 gr/7,5 g ⊕



69026 · 116 gr/7,5 g ⊕

## 6.5 MM (.264)



66551 · 77 gr/5,0 g ⊕



66522 · 80 gr/5,2 g ⊕



66512 · 139 gr/9,0 g ⊕



66513 · 139 gr/9,0 g ⊕



66531 · 139 gr/9,0 g ⊕



66510 · 144 gr/9,3 g



66532 · 156 gr/10,1 g ⊕

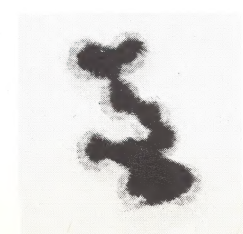
## .270 cal. (.277)



66902 · 130 gr/8,4 g ⊕



66903 · 150 gr/9,7 g ⊕



## 8 MM (.318)



67901 · 196 gr/12,7 g ⊕

## 8 MM S (.323)



68013 · 108 gr/7,0 g ⊕



68012 · 154 gr/10,0 g ⊕



68003 · 196 gr/12,7 g ⊕



68007 · 196 gr/12,7 g ⊕

# norma

## Tri-Clad ⊕ Bullets

These are game bullets with a special type of jacket. It consists of a mild steel material covered on both sides with either gilding metal or cupro-nickel alloy. The outside layer acts both as a lubricant between bullet and bore and as a protective coating against corrosion. The advantage of the TRI-CLAD bullet is that the steel material is stiff enough to retain the expanded strips of the jacket at an angle, rather than folding back. This means the jacket supports the expanded front end of the lead core and keeps the bullet from disintegrating.

## .38 cal. (.357)



69123 · 110 gr/7,1 g ⊕



69110 · 148 gr/9,5 g



69101 · 158 gr/10,2 g



69107 · 158 gr/10,2 g



69112 · 158 gr/10,2 g

## .44 cal. (.430)



61101 · 236 gr/15,3 g ⊕

## .45 cal. (.451)



61122 · 230 gr/14,9 g ⊕

100 bullets per box.



# norma



## Powders and Primers

### Norma Powder 200

A fast-burning powder, for small capacity cartridge cases such as the 222, but also most excellent for use with light bullets and/or light loads in larger calibers. Canisters of 400 grams net.

### Norma Powder 201

Slower than the 200, used with the lighter bullets in medium-size cases, or with some big caliber cartridges where there is a large bore volume to be filled up quickly by the expanding gases. Canisters of 400 grams net.

### Norma Powder 203

The 203 is adjusted to fit the medium-sized cartridge types such as the 30-06, 303 British, European 7 and 8 MM's etc. unless light bullets necessitate a faster powder. Canisters of 400 grams net.

### Norma Powder 204

A slow-burning powder, especially adapted for cartridges with a large case capacity and/or using heavy bullets in relation to the caliber. Canisters of 400 grams net.

### Norma Magnum Rifle Powder

An exceptionally slow burning, high-energy powder for highest velocity with large capacity cases. A must for Magnums. Canisters of 400 grams net.

### Norma Powder R-123

is a slow-burning handgun powder for heavier loads in cartridges such as 357 and 44 Magnum caliber, especially when using jacketed bullets. Retaining the easy handling and clean burning characteristics of the R-1, this powder gives a lower breech pressure and the charge weight can therefore be increased for higher bullet velocities. It ignites easily with regular type primers. As with all high-velocity handgun loads, care should be taken to not exceed recommended maximum charge weight. Canisters of 400 grams net.

### Norma Powder R-1

is a fast-burning, easily ignited powder especially adapted for revolver cartridges with lead bullets, such as 38 Special target loads. It is exceptionally clean burning, and the granules are of such size and shape that they flow easily in the powder measure and without binding the

cylinder. Therefore, R-1 gives excellent load-to-load uniformity. It also handles very easily in the spoon or powder trickler for shooters who prefer weighing their loads. Canisters of 275 grams net.

### Norma Primer SP

175" diameter, for revolver and automatic pistol cartridges. 100 primers per box.

### Norma Primer SR

175" diameter, for small caliber rifle cartridges, such as 222, 30 US Carbine and others. 100 primers per box.

### Norma Primer LP

210" diameter, for large caliber revolver and automatic pistol cartridges. 100 primers per box.

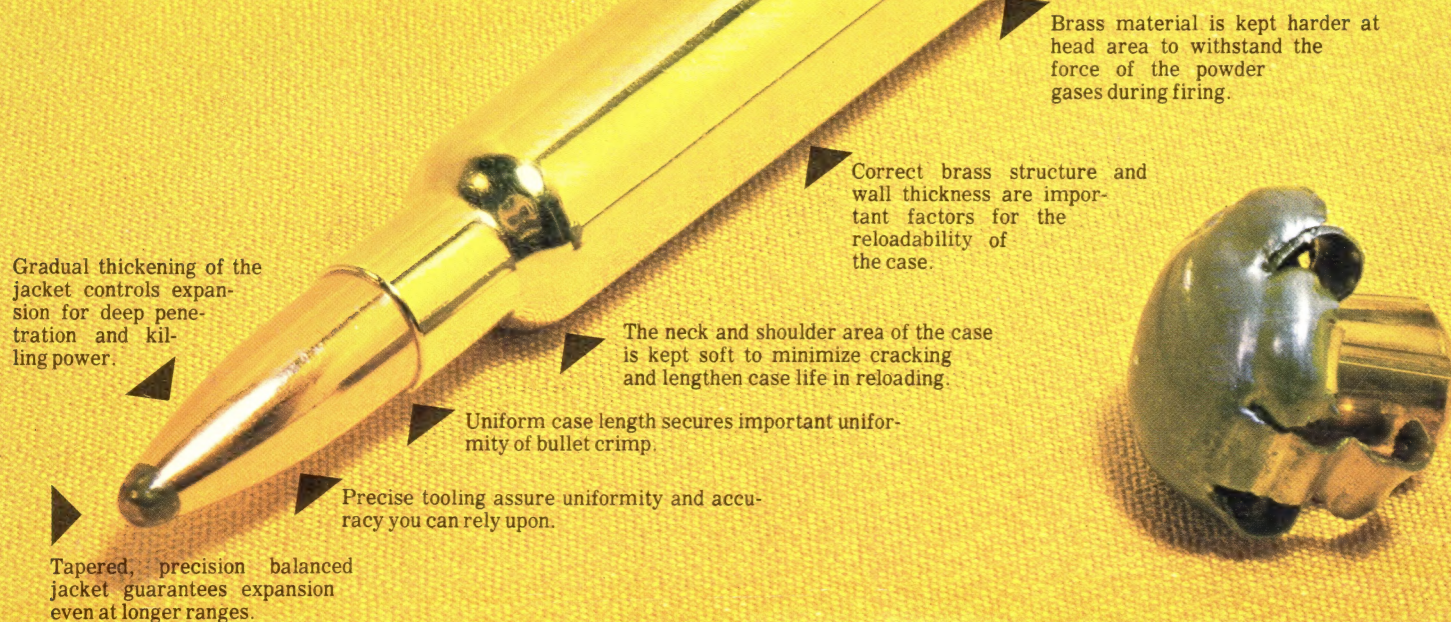
### Norma Primer LR

210" diameter, for rifle cartridges, including magnums. 100 primers per box.



# Reloaders use Norma components!

Norma started out as a bullet factory and has always been catering to the handloading fraternity. Norma brass cases are therefore designed and made with the reloader in mind. The empty unprimed brass cases sold in boxes of 20 for handloading are exactly the same as those used for Norma factory loaded ammunition.



## Representatives

### Australia

Lyttle & Westaway Pty. Ltd. Broughton House, 181 Clarence Street, G.P.O. Box 3665, SYDNEY 2001

### Austria

Franz Sarnitz Ges. m.b.H. 1191 WIEN, Osterleitengasse 5, Postfach 111.

### Belgium

Auguste Francotte & Cie  
61, Mont Saint-Martin  
B-4000 LIEGE

### Canada

All Sports Distributors  
6015-4th St. S. E.  
P. O. Box 5868 Station "A"  
CALGARY Alb. T2H 1Y4

### Canada East

Globe Firearms Ltd., 140-144 St. Paul Street, OTTAWA 7, Ontario

### Canada West

Geo. L. McNicol Co. Ltd., 4248 Prospect Road, NORTH VANCOUVER, B.C.

### Colombia

José Puyana U. Apartado Aereo No 598, BUCARAMANGA

### Denmark

A/S Dansk Ammunitionsfabrik  
DK-5450 OTTERUP

Guldmann Eftf. A/S  
DK-4220 KORSÖR

### Mercia

Kronprinsensgade 13  
DK-1114 KÖPENHAMN K

### Steen Yde ApS

Fjordvej 21  
DK-8900 RANDERS

### England

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### Finland

Oy Eloranta, Kauppakatu 16, KUOPIO  
Oy Julius Tallberg AB, Alexandersg 21, HELSINGFORS 10  
Oy Schröder AB, Box 21136, HELSINGFORS 21

Oy H W Snellman, Rautatavaratalo, Kirkkokatu 16, OULU

### France

Raymond Gérard, 22 rue Rottembourg, F-75 PARIS

Ets. Humbert, Postale 42030, ST. ETIENNE-CEDEX

### Germany

Firma Gustav Jehn, D-478 LIPPSTADT, Postfach 243.

Firma Albrecht Kind, D-5270 GUMMERSBACH-Postfach 310145.

### Holland

Handelsonderneming Scheepers B.V.  
Valkenburgerweg 42, VOERENDAAL

### Ireland

L.J. Warnants & Co Ltd, 87/89 Waterloo Road, DUBLIN 4

### Italy

Messrs. S. Ovadia, Via Gustavo Modena 15, 20129 MILANO

### Japan

Nikko Industrial Co., Ltd., Daini-Nurikiko Bldg., 4 2-chome, Takara-cho, Chuo-ku, TOKYO

### New Zealand

C.R. Pain Ltd., C.P.O. Box 256, AUCKLAND

### Norway

Rano, Postbox 40, Refstad, OSLO 5

### Spain

Messrs. Borchers S.A., Apartado 22, GUERNICA (Vizcaya)

### Switzerland

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**norma**

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